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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/419,901	10/18/1999	JENNIFER E. VAN EYK	1997-023-04U	2043

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EXAMINER
COOK, LISA V

ART UNIT	PAPER NUMBER
1641	22

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Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary	Application No.	Applicant(s)	
	09/419,901	VAN EYK ET AL.	
	Examiner	Art Unit	
	Lisa V. Cook	1641	

-- The MAILING DATE of this communication appears on the cover sheet with the corresp ndence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133).
- Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

1)☒ Responsive to communication(s) filed on *22 August 2002* .

2a)☐ This action is **FINAL**. 2b)☒ This action is non-final.

3)☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

4)☒ Claim(s) *1-28,31,34-50 and 56-68* is/are pending in the application.

4a) Of the above claim(s) *42-50 and 56-68* is/are withdrawn from consideration.

5)☐ Claim(s) _____ is/are allowed.

6)☒ Claim(s) *1-28,31 and 34-41* is/are rejected.

7)☐ Claim(s) _____ is/are objected to.

8)☒ Claim(s) *1-28,31,34-50 and 56-68* are subject to restriction and/or election requirement.

Application Papers

9)☐ The specification is objected to by the Examiner.

10)☐ The drawing(s) filed on _____ is/are: a)☐ accepted or b)☐ objected to by the Examiner.

Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).

11)☐ The proposed drawing correction filed on _____ is: a)☐ approved b)☐ disapproved by the Examiner.

If approved, corrected drawings are required in reply to this Office action.

12)☐ The oath or declaration is objected to by the Examiner.

Priority under 35 U.S.C. §§ 119 and 120

13)☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).

a)☐ All b)☐ Some * c)☐ None of:

1.☐ Certified copies of the priority documents have been received.

2.☐ Certified copies of the priority documents have been received in Application No. _____ .

3.☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

14)☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. § 119(e) (to a provisional application).

a) ☐ The translation of the foreign language provisional application has been received.

15)☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. §§ 120 and/or 121.

Attachment(s)

1) ☐ Notice of References Cited (PTO-892)
2) ☒ Notice of Draftsperson's Patent Drawing Review (PTO-948)
3) ☒ Information Disclosure Statement(s) (PTO-1449) Paper No(s) *4* .
4) ☐ Interview Summary (PTO-413) Paper No(s). _____ .
5) ☐ Notice of Informal Patent Application (PTO-152)
6) ☐ Other: .

DETAILED ACTION

Amendment Entry

1. Applicants' response to the Office Action mailed March 22, 2002 (Paper #17, filed 5/22/02) is acknowledged. In response to amendment-D filed therein, claims 29, 30, 32, and 33were canceled without prejudice or disclaimer.

Election/Restrictions

2. Applicants' election of Group I – claims 1-41 with traverse is acknowledged. (See paper#10, filed 5/14/01).

First, Applicant contends that the methods in claims 1-41 (Group I) and claims 56-68 (Group IV) are drawn to a method for assessing muscle damage. Particularly, arguing that claims 56-68 merely specify one embodiment by which the presence or absence of a myofilament protein modification product can be evaluated. This argument was carefully considered but not found persuasive because Group I is drawn to muscle damage assessment by the detection of a myofilament protein modification product which is not dependent on an incubation with a test compound or characterization profile as recited in the method invention of Group IV. Therein Group IV is not a specific embodiment fully encompassed in the method of Group I. Group IV requires additional limitations within the method (i.e. test compound and characterization profile) which make the methods distinct. Group I and Group IV have different method steps and employ different reagents which makes restriction appropriate.

Secondly, Applicant does not traverse the Restriction Requirement on the grounds of lack of patentable distinctness. The traversal on the ground(s) "that the examiner has not shown that a serious burden would be required to examine all of the claims", is not found convincing.

This is not found persuasive because MPEP § 808.02 recites:

> Where related inventions as claimed are shown to be distinct under the criteria of MPEP § 806.05(c)- § 806.05(i), the examiner, in order to establish reasons for insisting upon restriction, must show by appropriate explanation one of the following: (A) Separate classification thereof, (B) A separate status in the art when they are classified together, or (C) A different field of search.

In the instant case, (A) -The Restriction Requirement under 35 U.S.C. § 121 in Paper #7 established distinctness of the inventions and separate classification thereof:

(B) The inventions of Groups I, II, III, and IV would require a separate status in the art when they are classified together; the invention as a whole is drawn to a method of measuring protein bi-products via antibody binding to assess muscle damage. Such inventions are classified in 435, subclass 7.1 for example.

(C) With respect to a different field of search – Because these inventions are distinct and have acquired separate status in the art as shown by their different classification, recognized divergent subject matter and because the search required for each invention is not substantially coextensive with the search required for the remaining invention, restriction for examination purposes as indicated is proper. Please note that the classifications in the restriction are illustrative only and do **not** represent all the classes and subclasses which must be searched for each invention; nor is the search limited to issued US patents, but rather includes published foreign patents and applications as well as literature search. For these reasons the inventions of Groups I, II, III and IV were not joined.

3. The Restriction Requirement is still deemed proper and is therefore made **FINAL.**

4. Currently, claims 1-28, 31, 34-50, and 56-68 are subject to Restriction and Election Requirement. Claims 42-50 and 56-68 have been withdrawn from further consideration by the examiner, 37 CFR 1.142(b), as claims drawn to a non-elected invention. Claims 1-28, 31, and 34-41 are currently under examination.

Priority

5. The instant application does not claim priority or benefits to an earlier application.

Drawings

6. The drawings in this application are objected to by the Draftsperson under 37 CFR 1.84 or 1.152 (see PTO-948). Applicant is required to submit a proposed drawing correction in reply to this Office action.

Information Disclosure Statement

7. The listing of references in the specification is not a proper information disclosure statement. 37 CFR 1.98(b) requires a list of all patents, publications, or other information submitted for consideration by the Office, and MPEP § 609 A(1) states, "the list may not be incorporated into the specification but must be submitted in a separate paper." Therefore, unless the Examiner on form PTO-892 or Applicant on form PTO-1449 has cited the references they have not been considered.

8. The information disclosure filed 4/14/00 has been considered as to the merits before First Action.

Please note: Applicants claimed method is directed to muscle damage assessment via the evaluation of a "myofilament modification product". The disclosure defines the term "myofilament protein modification product" as any modification of a myofilament protein associated with muscle damage. (page 15, line 15) However, the disclosure does not show possession of the claimed invention. The following rejections address this issue:

Claim Rejections - 35 USC § 112

The following is a quotation of the first paragraph of 35 U.S.C. 112:

> The specification shall contain a written description of the invention, and of the manner and process of making and using it, in such full, clear, concise, and exact terms as to enable any person skilled in the art to which it pertains, or with which it is most nearly connected, to make and use the same and shall set forth the best mode contemplated by the inventor of carrying out his invention.

9. Claims 1-28, 31, and 34-41 are rejected under 35 U.S.C. 112, first paragraph, as containing subject matter which was not described in the specification in such a way as to enable one skilled in the art to which it pertains, or with which it is most nearly connected, to make and/or use the invention. The claims are directed to a method of assessing any and all muscle damage in a subject by evaluating at least one "myofilament protein modification product being a chemical adduct of a myofilament protein". However, the disclosure does not clearly identify what proteins will qualify as myofilament protein modification products. On page 15 lines 15-18 the method is directed to any and all proteins having the desired function (association with muscle damage). All the examples are directed to troponin modification products as a result of specific events outlined on page 30, 1-9 subsequently detected with the 81-7 antibody and evaluated with respect to MI (myocardial infarction) or HF (heart failure). Even these examples are inconclusive or are based on a small sample set. For example, see page 38, lines 1-6 – two patients having large quantities of phosphorylated TnI correlated to MI.

The disclosure does not identify the phosphorylated TnI as a "myofilament protein modification product being a chemical adduct of a myofilament protein". More specifically example V appears to detect myofilament protein modification product in human myocardium beginning on page 49. However, using the antibody 81-7 not only modified forms of TnI were detected and correlated to heart damage following unsuccessful transplant attempts; but intact TnI, dephosphorylated TnI, as well as protein-protein complexes involving TnI were measured. See page 50, 1st paragraph.

Enablement requires that the specification teach those in the art to make and use the invention without undue experimentation. Factors to be considered in determining whether a disclosure would require undue experimentation include 1) the nature of the invention, 2) the state of the prior art, 3) the predictability or lack thereof in the art, 4) the amount of direction or guidance present, 5) the presence or absence of working examples, 6) the quantity of experimentation necessary, 7) the relative skill of those in the art, and 8) the breadth of the claims.

The nature of the invention- the invention is directed to a method for assessing muscle damage in a subject by evaluating the presence or absence of a myofilament protein modification product being a chemical adduct of a myofilament protein.

The state of the prior art- the prior art of record fails to disclose a method that is applicable to any and all the presence or absence of a myofilament protein modification product being a chemical adduct of a myofilament protein useful in any and all muscle damage.

The predictability or lack thereof in the art- there is no predictability based on the instant specification that the claimed method will work with all proteins having a myofilament protein modification product being a chemical adduct of a myofilament protein.

The amount of direction or guidance present- appropriate guidance is provided by the specification for the claimed method to work in Troponin. However, the specification fails to provide any guidance to enable the claimed method to function with any and all myofilament protein modification products.

The presence or absence of working examples- There are no working examples that show analogous results, which are encompassed by the broad scope of the instant claims.

The quantity of experimentation necessary- it would require undue amount of experimentation for the skilled artisan to make and use the method as claimed.

*The relative skill of those in the art-*the level of skill in the art is high.

The breadth of the claims- as recited, the instant claims are directed to a method that is applicable a myofilament protein modification product being a chemical adduct of a myofilament protein.

While the specification exemplifies Troponin as a protein measured in MI and HF, the specification does not show any working examples of the claimed method in any protein meeting the claim limitations with respect to a myofilament protein modification product being a chemical adduct of a myofilament protein. The fact that the claimed method appears to work in Troponin is not sufficient to enable the breadth of the claimed method for any and all proteins having a myofilament protein modification product being a chemical adduct of a myofilament protein.

Therefore, it is maintained that one of ordinary skill in the art could not make and use the invention as claimed without undue experimentation.

10. Claims 1-28, 31, and 34-41 are rejected under 35 U.S.C. 112, first paragraph, as containing subject matter which was not described in the specification in such a way as to reasonably convey to one skilled in the relevant art that the inventor(s), at the time the application was filed, had possession of the claimed invention.

In particular, claim 1 is drawn to a method employing a myofilament protein modification product being a chemical adduct of a myofilament protein. However, the claims and specification fail to provide the identity or structure of these myofilament protein modification product being a chemical adduct of a myofilament protein. The specification does not state the identity by sequence or any structural characteristics of any other protein meeting the claimed characteristics (myofilament protein modification product being a chemical adduct of a myofilament protein). The skilled artisan cannot envision the detailed structure of the isolated protein having utility in the instant method, thus conception is not achieved until reduction to practice has occurred, regardless of the complexity or simplicity of the method of isolation. An adequate description requires more than a mere statement that it is part of the invention. The nucleic acid structure is required. See *Fiers v. Revel*, 25 USPQ 2d 1601 at 1606 (CAFC 1993) and *Amgen Inc. V. Chugai Pharmaceutical Co. Lts.*, 18 USPQ2d 1016.

The protein activity characteristics and tail domain requirements distinguish the protein only by what it does, i.e., protein activity, which are purely functional distinctions. Even where there is an actual reduction to practice, which may demonstrate possession of an embodiment of an invention, it does not necessarily describe what the claimed invention is.

The instant specification and claims describe an myofilament protein modification product being a chemical adduct of a myofilament protein with respect to the proteins function (assessment of muscle damage), however this description does not describe the claimed protein acid itself.

See also, *In The Reagents of the University of California v. Eli Lilly* (43 USPQ2d 1398-1412), where the court held that a generic statement that defines a genus of nucleic acids by only their functional activity does not provide an adequate description of the genus. The court indicated that while Applicants are not required to disclose every species encompassed by a genus, the description of a genus is achieved by the recitation of a representative number of DNA molecules, usually defined by a nucleotide sequence, falling within the scope of the claimed genus. At section B(1), the court states that "An adequate written description of a DNA...'requires a precise definition, such as by structure, formula, chemical name, or physical properties', not a mere wish or plan for obtaining the claimed chemical invention". Thus a skilled artisan cannot envision all the contemplated myofilament protein modification product being a chemical adduct of a myofilament protein by the detailed chemical structure of the claimed protein and therefore conception cannot be achieved until reduction to practice has occurred.

Thus, in the absence of sequence information of the proteins, the protein activity fails to meet the written description requirements. Therefore the full breadth of the claims have not meet the written description provision of 35 USC 112, first paragraph.

11. Claims 1-28, 31, and 34-41 are rejected under 35 U.S.C. 112, first paragraph, as containing subject matter which was not described in the specification in such a way as to reasonably convey to one skilled in the relevant art that the inventor(s), at the time the application was filed, had possession of the claimed invention.

The written description in this case only sets forth Mab monoclonal antibodies 8I-7 and 2I-14 and therefore the written description is not commensurate in scope with the claims drawn to any compound that specifically binds the myofilament protein modification product. *Vas-Cath Inc. V. Mahurkar*, 19 USPQ2d 1111, clearly states that "applicant must convey with reasonable clarity to those skilled in the art that, as of the filing date sought, he or she was in possession *of the invention*. The invention is, for purposes of the 'written description' inquiry, *whatever is now claimed.*" (See page 1117). The specification does not "clearly allow persons of ordinary skill in the art to recognize that [he or she] invented what is claimed." (*See Vas-Cath* at page 1116). Applicant is reminded that *Vas-Cath* makes clear that the written description provision of 35 USC 112 is several from its enablement provision (see page 115).

With the exception of Mab monoclonal antibodies 8I-7 and 2I-14, the skilled artisan cannot envision the detailed structure of the encompassed monoclonal antibodies and therefore conception is not achieved until reduction to practice has occurred, regardless of the complexity or simplicity of the method of isolation. Adequate written description requires more than a mere statement that it is part of the invention and a reference to a potential method of isolating it. The monoclonal antibody itself is required. See *Fiers v. Revel*, 25 USPQ 2d 1601 at 1606 (CAFC 1993) and *Amgen Inc. V. Chugai Pharmaceutical Co. Lts.*, 18 USPQ2d 1016.

Furthermore, In *The Reagents of the University of California v. Eli Lilly* (43 USPQ2d 1398-1412), the court held that a generic statement which defines a genus of a compound/seq.id/etc. by only their functional activity does not provide an adequate written description of the genus.

The court indicated that while Applicants are not required to disclose every species encompassed by a genus, the description of a genus is achieved by the recitation of a representative number of molecules, usually defined by a sequence, falling within the scope of the claimed genus.

At section B(1), the court states that "An adequate written description ...'requires a precise definition, such as by structure, formula, chemical name, or physical properties', not a mere wish or plan for obtaining the claimed chemical invention" There is insufficient description in the disclosure to support the generic claims as provided by the Interim Written Description Guidelines published in the June 15, 1998 Federal Register at Volume 63, Number 114, pages 32639-32645.

Therefore only the isolated Mab monoclonal antibodies 8I-7 and 2I-14, but not any all compounds that specifically bind the myofilament protein modification product, would meet the full breadth of the claims as required by the written description provision of 35 USC 112, first paragraph.

12. Claims 1-28, 31, and 34-41 are rejected under 35 U.S.C. 112, first paragraph, as containing subject matter which was not described in the specification in such a way as to enable one skilled in the art to which it pertains, or with which it is most nearly connected, to make and/or use the invention.

The specification is not enabled for the Mab monoclonal antibodies 8I-7 and 2I-14 because the instant specification is not in compliance with the biological deposit rules. These antibodies have been deposited under the provisions of the Budapest treaty. Furthermore, filling of an affidavit or declaration by Applicant or assignee or a statement by an attorney of record who has authority and control over the conditions of deposit over his or her signature and registration number stating that the deposit has been accepted by an International Depository Authority under the provisions of the Budapest Treaty, that all restrictions upon public access to the deposit will be irrevocably removed upon the grant of a patent on this Application and that the deposit will be replaced if viable samples cannot be dispensed by the depository is required.

Without such a statement, it would be impossible for the skilled artisan to practice the invention made from the source material have no predictable reasonable expectation of success of being identical to the instantly disclosed monoclonal antibodies.

The specification does not enable any person skilled in the art to which it pertains, or with which it is most nearly connected, to make and use the invention commensurate in scope with these claims. Applicant provides guidance for the above noted monoclonal antibodies and provides no guidance as to what modifications or structure are important for the predictable function of any other monospecific antibody. Very different structures may be found on antibodies with the same specificity.

For example, very different V_H chains can combine with the same V_L chain to produce antibody binding sites with nearly the same size, shape, antigen specificity, and affinity. A similar phenomenon can also occur when different V_H sequences combine with different V_L sequences to produce antibodies with very similar properties. These observations indicate that divergent variable region sequences, both in and out of complementarity-determining regions, can be folded to form similar binding site contours, which result in similar immunochemical characteristics. Conversely, similar structure may be found on antibodies having different specificities. Accordingly, the art indicates that it would require undue experimentation to formulate and use a successful monoclonal antibody as recited in the instant invention without the prior demonstration of specific limitations that have not been recited. Amgen Inc. v. Chugai Pharmaceutical Co. Ltd. (18 USPQ 2d 1027 (CAFC 1991)).

With respect to the art rejection presented below: The disclosure merely teaches the detection of TnI as it relates to muscle damage. The examiner takes TnI to be a protein meeting the limitations of a myofilament protein modification product being a chemical adduct of a myofilament protein. See disclosure page 1-lines 17-22, page 4-lines 5-8, page 30, and page 50. Accordingly in order to promote compact prosecution the following art rejection is applied.

Claim Rejections - 35 USC § 102

13. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(a) the invention was known or used by others in this country, or patented or described in a printed publication in this or a foreign country, before the invention thereof by the applicant for a patent.

I. Claims 1, 8-10, 15-16, 19-21, and 34-37 are rejected under 35 U.S.C. 102(a) as being anticipated by McDonough et al. (Circulation Research, January 8/22, 1999, pages 9-20).

McDonough et al. disclose troponin I modifications which were reposnible for the contactile dysfunction in myocardial ischemia/reperfusion injury. See abstract. McDonough et al. further teach "the troponin complex is [a] regulatory element of the myofilamnet, which mediates the calcium dependence of muscle contraction in both cardiac and skeletal muscle". Page 9, 1st column , 1st paragraph. Several monoclonal antibodies were employed to measure TnI degradation products and characterize additional modifications within the troponin complex. See page 11 Results.

Claim Rejections - 35 USC § 103

14. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negative by the manner in which the invention was made.

This application currently names joint inventors. In considering patentability of the claims under 35 U.S.C. 103(a), the examiner presumes that the subject matter of the various claims was commonly owned at the time any inventions covered therein were made absent any evidence to the contrary. Applicant is advised of the obligation under 37 CFR 1.56 to point out the inventor and invention dates of each claim that was not commonly owned at the time a later invention was made in order for the examiner to consider the applicability of 35 U.S.C. 103(c) and potential 35 U.S.C. 102(f) or (g) prior art under 35 U.S.C. 103(a).

I. Claims 2-5, 7, and 38-40 are rejected under 35 U.S.C. 103(a) as being unpatentable over McDonough et al. (Circulation Research, January 8/22, 1999, pages 9-20) in view of Wicks et al. (US patent #5,834,220)

McDonough et al. are set forth above.

McDonuugh et al. differ from the instant invention in not teaching an assessment of muscle damage employing two different myofilament protein modification products.

However, Wicks et al. teach method for assaying for cardiac troponin I along with troponoin C. See abstract. The process and test system provide rapid and specific measurements of troponin I and is highly suitable for confirming the diagnosis of myocardial damage (reading on muscle damage).

It would have been obvious to one of ordinary skill in the art at the time the invention was made to measure two different myofilament product degradation products (troponin I and troponin C) in muscle damage as taught by Wicks et al. in the method of McDonough et al., involving troponin I analysis because Wicks et al. taught that Troponin I is one of three subunits of the troponin complex. The other two subunits (designated T and C) are also immobilized on the thin myofilaments along with troponin I in both cardiac and skeletal muscle tissue. Column 1., lines 23-40. The utility of both troponin I and troponin C allowed for further distnction between cardiac muscle damage or skeletal muscles damage. See column 2, lines 37-49.

One having ordinary skill in the art would have been motivated to do this to acquire the enhanced sensitivity and ability to reduce false positives while providing more data sets for analysis, wherein accurate and precise detection is available.

The patent of Van Eyke et al. was employed as prior art because priority was not claimed to the patented invention. The patent also contains a different inventive entity.

II. Claims 6, 11-14, 17-18, 22-28, 31, and 41 are rejected under 35 U.S.C. 103(a) as being unpatentable over McDonough et al. (Circulation Research, January 8/22, 1999, pages 9-20) in view of Wicks et al. (US patent #5,834,220) and in further view of Van Eyk et al. (US patent #6,248,549)

Please see McDonough et al. in view of Wicks et al. as set forth above.

McDonough et al. in view of Wicks et al. differ from the instant invention in not teaching an assessment of muscle damage employing two different myofilament protein modification products from different proteins involving phosphorylation.

However, Van Eyk et al. teach method for assaying for muscle damage (contractile state). Including heart failure and myocardial stunning. See abstract. In one embodiment PAK kinase activity is assessed by measuring the phosphoryaltion of two different proteins (troponin I and calponin for example) see column 3, lines 30-39 and claim 4.

It would have been obvious to one of ordinary skill in the art at the time the invention was made to measure two different myofilament product degradation products from different protein with respect to their phosphorylation states (troponin I and Calponin) in muscle damage as taught by Van Eyk et al. in the method of McDonough et al. in view of Wicks et al. to detect troponin I analysis because Van Eyk et al. taught that such method configurations allowed for the assessment of compositions in a screening format for their effect on PAK kinase activity or expression with respect to muscle disorders. See column 3, lines 1-39.

15. For reasons aforementioned, no claims are allowed.

16. Papers related to this application may be submitted to Group 1600 by facsimile transmission. Papers should be faxed to Group 1600 via the PTO Fax Center located in Crystal Mall 1. The faxing of such papers must conform to the notice published in the Official Gazette, 1096 OG 30 (November 15, 1989). The Group 1641 Fax number is (703) 308-4242, which is able to receive transmissions 24 hours/day, 7 days/week.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Lisa V. Cook whose telephone number is (703) 305-0808. The examiner can normally be reached on Monday-Friday from 8:00 AM - 4:30 PM.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Long Le, can be reached on (703) 305-3399.

Any inquiry of a general nature or relating to the status of this application should be directed to the Group receptionist whose telephone number is (703) 308-0196.

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1/2/03

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